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United States  
Department of Energy

Office of Electricity Delivery and Energy Reliability  
OE Docket No. PP-412

**ITC Lake Erie Connector**

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Presidential Permit  
No. PP-412

January 12, 2017

# Presidential Permit

## ITC Lake Erie Connector Order No. PP-412

### I. BACKGROUND

The Department of Energy (DOE) has the responsibility for implementing Executive Order (E.O.) 10,485, as amended by E.O. 12,038, which requires the issuance of a Presidential permit for the construction, operation, maintenance, or connection of electric transmission facilities at the United States international border.<sup>1</sup> DOE may issue such a permit if it determines that issuance of the permit is in the public interest and after obtaining favorable recommendations from the U.S. Departments of State and Defense.

On May 29, 2015, ITC Lake Erie Connector (ITC Lake Erie) filed an application with the Office of Electricity Delivery and Energy Reliability of the Department of Energy (DOE) for a Presidential permit. ITC Lake Erie has its principal place of business in Novi, Michigan. ITC Lake Erie is a wholly-owned subsidiary of ITC Lake Erie Holdings LLC, which is in turn a wholly-owned subsidiary of ITC Holdings Corp.

ITC Lake Erie proposes to construct and operate the Lake Erie Connector Project (the project), a +/- 320 kilovolt (kV) high-voltage direct current (HVDC) bi-directional electric transmission line that would originate in Haldimand County, Ontario, Canada, and terminate in Erie County, Pennsylvania. The proposed project facilities would be capable of transmitting up to 1,000 megawatts (MW) of power.

The U.S. portion of the proposed project would cross the U.S.-Canada border in Lake Erie as a submerged line, buried in the lake bed, and would run approximately 35.4 miles before reaching the shore on private property, west of Erie Bluffs Park. From the shore, the line would be buried underground for approximately 7 miles, along mostly roadway rights-of-way and terminate at the proposed Erie Converter Station. From the Erie Converter Station, a 345 kV alternating current (AC) transmission line would run approximately 0.6 miles underground and connect into the U.S. grid at the existing Erie West Substation owned by Penelec. The total length of the project would be approximately 72 miles, with the U.S. portion totaling about 42.8 miles.

DOE published a notice in the *Federal Register* on July 17, 2015 (80 Fed. Reg. 42490), inviting comments and motions to intervene. None were received.

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<sup>1</sup> The authority to administer the International Electricity Regulatory Program through the regulation of electricity exports and the issuance of Presidential permits has been delegated to the Assistant Secretary for the Office of Electricity Delivery and Energy Reliability (OE), by Redelegation Order No. 00-006.05 issued on November 17, 2014.

## II. DISCUSSION

In determining whether issuance of a Presidential permit is in the public interest, DOE as a policy considers the environmental impacts of the proposed project, determines the project's impact on reliability of the U.S. electric grid, and weighs any other factors that DOE may consider relevant to the public interest. When, as in this case, a separate reliability analysis is conducted by an Independent System Operator (ISO), DOE's practice has been to review the ISO's analysis and make a determination as to the project's impact on reliability.

### **A. Reliability Analysis**

The proposed project would cause a 1,042 MW withdrawal from the Independent Electric System Operator (IESO) of Ontario system over the Lake Erie Connector and a 1,000 MW injection into the PJM system. DOE staff reviewed the *Revised Merchant Transmission Interconnection System Impact Study Report* conducted by PJM for the 2017 planning year. The study's purpose was to "determine a plan, with approximate cost and construction time estimates, to connect the subject generation interconnection project to the PJM network at a location specified by the Interconnection Customer [ITC Lake Erie]." The study identified several upgrades that would be required to alleviate violations on the system that would occur when the line goes into operation.

In a letter to dated December 21, 2016, PJM clarified that the study examined bidirectional energy transmission over the proposed facilities. Furthermore, PJM indicated that any upgrades listed in the *Revised Merchant Transmission Interconnection System Impact Study Report* and the *Bi-Directional 1000 MW HVdc Tie-Line from Ontario to PJM Interconnection Impact Study* by the New York Independent System Operator (NY-ISO) would also be complete prior to the line going into service. Finally, PJM noted that the project is currently undergoing further examination via the Facilities Study. The Facilities Study will refine the findings of the System Impact Study and "inform the overall requirements for construction associated with the impacts identified in previous studies as well as revisit those studies previously completed" in order to ensure that there will be no adverse reliability impacts due to the project's operation.

### **B. Environmental Analysis**

On August 28, 2015, DOE determined that the appropriate level of National Environmental Policy Act (NEPA) review for this project was an environmental assessment (EA). The Lake Erie Connector Project EA (DOE/EA-2019), was prepared by the DOE pursuant to NEPA and its implementing regulations. The U.S. Army Corps of Engineers (USACE)-Pittsburgh District was a cooperating agency in preparing the Lake Erie Connector Project EA.

Comments on the Draft EA were accepted from June 3, 2016 – July 5, 2016, following publication of the Notice of Availability (NOA) in the Erie Times newspaper. The NOA was also sent to interested parties, including federal, state, and local officials;

regulatory agency representatives; stakeholder organizations; and private individuals in the vicinity of the proposed transmission line. The Draft EA was available to the general public on the project website at [www.lakeerieconnectoreea.com](http://www.lakeerieconnectoreea.com). All comments were considered during preparation of the Final EA. Appendix I-Comment Response Document of the Final EA contains revisions and new information based in part on comments received on the Draft EA.

The Final EA was distributed to all individuals and parties that submitted substantive comments on the Draft EA and to other interested parties who requested a copy of the Final EA. DOE received no comments on the Final EA. The Final EA is available via the Lake Erie Connector Project website <http://lakeerieconnectoreea.com>, as well as the DOE NEPA website at <http://www.energy.gov/nepa/>.

### **C. Concurrences**

On September 9, 2016, the Secretary of State concurred with the issuance of a Presidential Permit to ITC Lake Erie for the Lake Erie Connector. On August 22, 2016, the Secretary of Defense concurred as well.

## **III. FINDINGS AND DECISION**

DOE staff concur with PJM's conclusions and determine that the 1,042 MW withdrawal from the Independent Electric System Operator of Ontario system over the Lake Erie Connector with a 1,000 MW injection into the PJM system will not have a negative impact on the reliability of the United States electric grid if operated consistent with both PJM and the North American Electric Reliability Corporation (NERC) policies and standards, terms and conditions of the Presidential Permit, and other regulatory and statutory requirements.

In addition to DOE's reliability determination, based upon the results of the environmental analysis, concurrences of the Departments of State and Defense, and public comment process, DOE determines that the issuance of a Presidential permit to ITC Lake Erie is consistent with the public interest.

## **IV. DATA COLLECTION AND REPORTING**

The responsibility for the data collection and reporting under Presidential permits authorizing electric transmission facilities at the U.S. international border and orders authorizing electricity exports to a foreign country has been transferred from the Office of Electricity Delivery & Energy Reliability to DOE's Energy Information Administration (EIA). ITC Lake Erie is required to submit Form EIA-111 "Quarterly Electricity Imports and Exports Report," or any successor forms, as specified by the EIA. ITC Lake Erie is instructed to follow EIA instructions in utilizing the Data xChange Community Portal. Questions regarding the data collection and reporting requirements can be directed to the EIA by email at [EIA4USA@eia.gov](mailto:EIA4USA@eia.gov) or by phone at 1-855-342-4872.

## V. ORDER

Pursuant to the provisions of Executive Order 10,485, as amended by E.O. 12,038, and the regulations issued thereunder (Title 10, Code of Federal Regulations, Part 205), permission is granted to ITC Lake Erie Connector to construct, own, maintain, and connect electric transmission facilities at the international border of the United States and Canada, as further described in Article 2 below, upon the following conditions:

Article 1. The facilities herein described shall be subject to all conditions, provisions and requirements of this Permit. This Permit may be modified or revoked by the President of the United States without notice, or by DOE after notice, and may be amended by DOE after proper application thereto.

Article 2. The facilities covered by and subject to this Permit shall include the following facilities and all supporting structures within the right-of-way occupied by such facilities:

A 72-mile long, 1,000-megawatt (MW) HVDC bi-direction electric power transmission system that originates in Haldimand County, Ontario, Canada and terminates in Erie County, Pennsylvania, United States. The proposed project would cross the United States-Canadian border in Lake Erie as a submerged cable and extend approximately 35.4 miles underwater through Lake Erie and emerge onshore in Erie County, Pennsylvania on private property west of Erie Bluffs Park. The proposed project would run approximately 7 miles underground to a proposed converter station in Conneaut Township, Erie County, Pennsylvania. Approximately 0.6 of 345 kV AC underground transmission cables would run between the proposed new Erie Converter Station and the nearby Penelec Erie West Substation. The total U.S. portion of the line would be approximately 42.8 miles.

Article 3. The facilities described in Article 2 above, shall be designed and operated in accordance with all policies and standards of the Federal Energy Regulatory Commission, NERC, Regional Entities, Reliability Coordinators, and independent system operators, or their successors, as appropriate, on such terms as expressed therein and as such criteria, standards, and guides may be amended from time to time. The facilities shall also be operated consistent other regulatory and statutory requirements.

Furthermore, the facilities described in Article 2 shall be operated in such a manner that the scheduled rate of transmission of electric energy north to south entering the United States over the facilities operated herein shall not exceed 1,000 MW for both summer and winter periods into the Penelec Erie West Substation. The facilities are approved for south to north transfer, but entities seeking to do so would require an electricity export authorization pursuant to section 202 (e) of the Federal Power Act.

Article 4. No change shall be made in the facilities covered by this Permit or in the authorized operation or connection of these facilities unless such change has been approved by DOE.

Article 5. ITC Lake Erie shall at all times maintain the facilities covered by this Permit in a satisfactory condition so that all requirements of the National Electric Safety Code in effect at the time of construction are fully met.

Article 6. The operation and maintenance of the facilities covered by this Permit shall be subject to the inspection and approval of a designated representative of DOE, who shall be an authorized representative of the United States for such purposes. ITC Lake Erie shall allow officers or employees of the United States, with written authorization, free and unrestricted access into, through and across any lands occupied by these facilities in the performance of their duties.

Article 7. ITC Lake Erie shall investigate any complaints from nearby residents of radio or television interference identifiably caused by the operation of the facilities covered by this Permit. ITC Lake Erie shall take appropriate action as necessary to mitigate such situations. Complaints from individuals residing within one-half mile of the centerline of the transmission line must be resolved. ITC Lake Erie shall maintain written records of all complaints received and of the corrective actions taken.

Article 8. The United States shall not be responsible or liable for damages of any kind which may arise from or be incident to the exercise of the privileges granted herein. ITC Lake Erie shall hold the United States harmless from any and all such claims.

Article 9. ITC Lake Erie shall arrange for the installation and maintenance of appropriate metering equipment to record permanently the hourly flow of all electric energy transmitted between the United States and Canada over the facilities authorized herein. ITC Lake Erie shall make and preserve full and complete records with respect to the electric energy transactions between the United States and Canada. ITC Lake Erie shall collect and submit the data to EIA as required by and in accordance with the procedures of Form EIA-111, "Quarterly Electricity Imports and Exports Report" and all successor forms.

Article 10. Neither this Permit nor the facilities covered by this Permit, or any part thereof, shall be transferable or assignable, unless specifically authorized by DOE in accordance with Title 10, Code of Federal Regulations.

Article 11. Upon the termination, revocation or surrender of this Permit, the permitted facilities which are owned, operated, maintained, and connected by ITC Lake Erie and described in Article 2 of this Permit, shall be removed and the land restored to its original condition within such time as DOE may specify and at the expense of ITC Lake Erie. If ITC Lake Erie fails to remove such facilities and/or any portion thereof authorized by this Permit, DOE may direct that such actions be taken for the removal of the facilities or the restoration of the land associated with the facilities at the expense of ITC Lake Erie. ITC Lake Erie shall have no claim for damages by reason of such possession, removal or repair. However, if certain facilities authorized herein are useful

for other utility operations within the bounds of the United States, DOE may not require that those facilities be removed and the land restored to its original condition upon termination of the international interconnection.

Article 12. ITC Lake Erie has a continuing obligation to give DOE written notification as soon as practicable of any prospective or actual changes of a substantive nature in the circumstances upon which this Order was based, including but not limited to changes in authorized entity contact information.

Issued in Washington, D.C., on January 12, 2017.

A handwritten signature in cursive script, appearing to read 'Meghan Conklin', written over a horizontal line.

Meghan Conklin  
Deputy Assistant Secretary  
Transmission Permitting and Technical Assistance Division  
Office of Electricity Delivery and Energy Reliability